

Title (en)  
EXHAUST PURIFICATION SYSTEM

Title (de)  
ABGASREINIGUNGSSYSTEM

Title (fr)  
SYSTÈME DE PURIFICATION D'ÉCHAPPEMENT

Publication  
**EP 3438426 A4 20190206 (EN)**

Application  
**EP 17774649 A 20170323**

Priority  
• JP 2016064111 A 20160328  
• JP 2017011671 W 20170323

Abstract (en)  
[origin: EP3438426A1] An exhaust purification system is equipped with: a linear exhaust pipe 13 through which exhaust gas emitted from an engine 10 passes; an injection nozzle 33 that injects a reducing agent into the exhaust pipe 13 at an oblique angle with respect to the axial direction of the pipe; a reduction catalyst 41 that is provided in the exhaust system downstream from the injection nozzle 33, and that purifies the exhaust gas by causing the exhaust gas to react with the reducing agent; and a mixer member 50 that is provided inside the exhaust pipe 13, downstream from the injection nozzle 33, and that causes the reducing agent to mix with the exhaust gas and diffuse. The mixer member 50 includes multiple fins 54A and B protruding downstream, and is arranged inclined inside the exhaust pipe 13 such that the upstream surface 50A thereof faces the injection opening surface of the injection nozzle 33.

IPC 8 full level  
**F01N 3/24** (2006.01); **B01D 53/94** (2006.01); **F01N 3/08** (2006.01); **F01N 3/20** (2006.01); **F01N 3/28** (2006.01)

CPC (source: EP US)  
**B01D 53/94** (2013.01 - EP US); **B01D 53/9431** (2013.01 - US); **B01F 23/2132** (2022.01 - US); **B01F 25/3141** (2022.01 - US); **B01F 25/4231** (2022.01 - US); **F01N 3/2073** (2013.01 - US); **F01N 3/208** (2013.01 - EP US); **F01N 3/2892** (2013.01 - EP US); **F01N 2240/20** (2013.01 - EP US); **F01N 2610/02** (2013.01 - EP US); **F01N 2610/1453** (2013.01 - EP US); **Y02T 10/12** (2013.01 - EP)

Citation (search report)  
• [X] DE 102013223956 A1 20150528 - BOSCH GMBH ROBERT [DE]  
• [XA] EP 1712751 A2 20061018 - IVECO SPA [IT]  
• [XA] WO 2013088923 A1 20130620 - ISUZU MOTORS LTD [JP]  
• [XA] EP 2592246 A2 20130515 - DOOSAN INFRACORE CO LTD [KR]  
• [XA] US 8371114 B2 20130212 - HAYASHI MIWA [JP], et al  
• [XA] US 2015267587 A1 20150924 - CALVO SILVIA [DE]  
• [I] US 2010132345 A1 20100603 - SOLBRIG CHARLES E [US], et al  
• See references of WO 2017170108A1

Designated contracting state (EPC)  
AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)  
BA ME

DOCDB simple family (publication)  
**EP 3438426 A1 20190206**; **EP 3438426 A4 20190206**; **EP 3438426 B1 20200513**; CN 109072752 A 20181221; JP 2017180133 A 20171005; JP 6662144 B2 20200311; US 10450921 B2 20191022; US 2019120110 A1 20190425; WO 2017170108 A1 20171005

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